

The strata in which the cones of *S. dakotensis* were found belong to a group whose geologic age is in dispute, the United States Geological Survey designation being Eocene (?). Some students assign the beds to the Upper Cretaceous, others regard them as early Eocene. Similarly the age of the somewhat younger Fort Union formation has also been questioned. In the latter, at several localities in North Dakota, Montana, and Wyoming, the writer has found *Sequoia* cones that greatly resemble *S. dakotensis*, except that apparently the average number of scales is about 28, a reduction from *S. dakotensis* and an approach toward the *S. langsdo.rfii* and *S. sempervirens* types. Whether these considerations concerning *S. dakotensis* can be made a part of the basis for the geologic dating of these disputed beds remains to be tested by further evidence.

Types and figured specimens in the U. S. National Museum.

ORNITHOLOGY.—*A new race of the crested eagle-hawk*, *Spizaetus ornatus*.¹ HERBERT FRIEDMANN, U. S. National Museum.

On examining a long series of *Spizaetus ornatus*, representing the combined material of the Museum of Comparative Zoölogy, the Academy of Natural Sciences of Philadelphia, the Carnegie Museum, the Field Museum, California Institute of Technology, United States Biological Survey, and the United States National Museum, it became evident that there were two races involved, one from the Guianas, Brazil, and Venezuela, to Paraguay, northeastern Argentina, and Bolivia; and one from Mexico and Central America, south to Colombia and Ecuador, and, possibly, to Peru. When sending me the Carnegie Museum series, Mr. Todd wrote me that he had long suspected the existence of two races, a Central American and a South American. When I found that there were indeed two races although their ranges were not quite as Todd's brief note suggested, I wrote him suggesting that he describe the northern form. This he declined to do as I had all the material assembled before me. The least I can do in return for his courtesy is to use one of his specimens as the type of the new race.

Inasmuch as the type locality of *ornatus* is Cayenne, it follows that this name must be applied to the birds of the Guianas, Brazil, etc. Although several synonyms are extant for the nominate race, no name seems to be applicable to the Central American-western South American form. I therefore propose the name

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Spizaetus ornatus vicarius subsp. nov.

Type: Carnegie Museum number 24881, adult female, collected by Morton E. Peck, in the pine ridge country near Manatol Lagoon, British Honduras, July 5, 1905.

Subspecific characters: Adult similar to that of the nominate race, but with the sides of the face, neck, and throat duller, snuff brown to mikado brown (instead of cinnamon rufous to hazel as in typical *ornatus*); the abdomen more heavily streaked with black transverse spots; and with the black malar stripe from the angle of the bill, separating the brown cheeks and auriculars from the white chin and mid-throat, generally, but not invariably, broader: young similar to that of the nominate race, but with the crown generally more heavily washed with tawny cinnamon and with numerous, small, dark fuscous streaks (crown almost or entirely without dark fuscous streaks in young of the typical form).

Range: As indicated above—southern Mexico, Guatemala, Honduras, British Honduras, Nicaragua, Costa Rica, Panama, Colombia, and Ecuador. I have seen no Peruvian specimens and cannot say whether or not birds from that country are of this form. The species has been recorded from Chyavetas, Peru. I should expect from the fact that the Ecuadorian bird seen (from Paramba in northern Ecuador) is *vicarius* and that Bolivian examples seen (from Rio Surutu and Rio Yapacani) are *ornatus*, northern Peruvian birds would be closer to *vicarius* and southern and especially southwestern ones to *ornatus*.

I have seen no birds from Trinidad and assume that they are *ornatus* like those from Venezuela. However, the only Tobago bird seen, a young one, is as similar to *vicarius* as to *ornatus*. It may be, however, that the juvenal plumage characters of the two races are not valid, in which case there would be no reason for considering this bird *vicarius*.

Material examined: *S. o. ornatus*: 8 specimens from British Guiana, Brazil, Venezuela, Paraguay, Bolivia, and one from Tobago that may be *vicarius*.

S. o. vicarius: 25 specimens from Mexico, Guatemala, Honduras, British Honduras, Nicaragua, Costa Rica, Panama, Colombia, and Ecuador.

I am greatly indebted to Mr. Peters, Dr. Stone, Mr. Todd, Mr. Boulton, Mr. van Rossem, and Mr. Wheeler for the loan of material used in this study.

ZOOLOGY.—*Chinese spiders of the family Lycosidae*.¹ IRVING FOX.
(Communicated by PAUL BARTSCH.)

Through the kindness of the United States National Museum I was granted the opportunity of studying a collection of spiders made by D. C. Graham in Szechwan Province, China, during the years 1923 to 1930. I wish to express my appreciation to the authorities of the Museum for their helpfulness while this study was in progress, and especially to E. A. Chapin, curator of the Division of Insects. All the species described or discussed in this paper are in the collection of the United States National Museum.

¹ Received June 27, 1935.